

CLAIMS

1. A congestion controller for an Ethernet switch comprising

5 a plurality of transmission queues which
have different priorities,
a receiving means for receiving a PAUSE
frame,
a restriction means for restricting
transmission traffic from the transmission queues by the
10 received PAUSE frame, wherein
the restriction means restricts the
transmission traffic from a transmission queue of the
lowest priority by the PAUSE frame received at a time
other than the PAUSE time, and restricts the transmission
15 traffic from the transmission queue of the higher
priority, by the PAUSE frame received during the PAUSE
time.

2. A congestion controller for an Ethernet switch comprising

20 a transmission queue,
a receiving means for receiving a PAUSE
frame,
a shaping means for shaping the
transmission traffic from the transmission queue by the
25 received PAUSE frame, wherein
the shaping means restricts transmission
speed of the transmission traffic from the transmission
queue to or below a transmission speed based on a
predetermined shaping value.

30 3. A congestion controller according to Claim 2 in
which the restriction of the transmission speed is
performed by providing a gap in the transmission traffic.

4. A congestion controller for an Ethernet switch comprising

35 a transmission queue,
an identifying means for identifying an
input port which causes congestion by counting packets

resident in the transmission queue, corresponding to the input port, and

5 a transmission means for transmitting a PAUSE frame to other switch which is connected to the identified input port.

5. A congestion controller according to Claim 4 in which

10 the identifying means further identifies an application of the identified input port based on the attributes of the packets, and

 the transmission means notifies the other switch of the identified application by a PAUSE frame transmitted thereto.